

Table CT6. Industrial Sector Energy Consumption Estimates, Selected Years, 1960-2016, California

Year	Coal	Natural Gas ^a	Petroleum						Hydro-electric Power ^{e,f}	Biomass		Geo-thermal ^f	Solar ^{f,i}	Retail Electricity Sales	Net Energy ^{f,j}	Electrical System Energy Losses ^k	Total ^{f,j}
			Distillate Fuel Oil	HGL ^b	Motor Gasoline ^c	Residual Fuel Oil	Other ^d	Total		Million kWh	Wood and Waste ^{f,g}	Losses and Co-products ^h					
	Year	Thousand Short Tons	Billion Cubic Feet	Thousand Barrels						Million kWh	Million kWh	Million kWh					
1960	1,313	451	10,127	4,231	2,851	10,750	38,766	66,725	(s)	--	--	--	NA	20,190	--	--	--
1965	2,361	529	13,002	4,826	2,245	11,846	41,823	73,742	(s)	--	--	--	NA	28,904	--	--	--
1970	2,215	711	8,510	9,147	1,942	12,121	47,012	78,732	(s)	--	--	--	NA	42,169	--	--	--
1975	2,151	666	10,519	15,688	1,338	8,308	51,705	87,558	0	--	--	--	NA	46,053	--	--	--
1980	2,665	486	15,576	12,887	1,698	12,554	66,101	108,816	0	--	--	--	NA	51,888	--	--	--
1985	1,889	433	17,779	12,977	3,065	18,732	67,209	119,763	0	--	--	--	NA	52,972	--	--	--
1990	2,874	588	17,076	12,304	3,163	1,838	67,262	101,642	0	--	--	--	3	55,892	--	--	--
1995	2,485	698	11,664	8,489	2,849	1,467	56,088	80,556	0	--	--	--	5	57,367	--	--	--
1996	2,414	702	11,865	5,634	2,741	304	62,317	82,862	0	--	--	--	6	57,683	--	--	--
1997	2,697	794	14,035	4,169	2,910	102	59,730	80,946	0	--	--	--	7	62,017	--	--	--
1998	1,885	819	12,849	3,100	3,263	31	57,964	77,206	0	--	--	--	7	61,641	--	--	--
1999	2,034	792	14,766	5,068	1,922	570	63,730	86,055	0	--	--	--	9	63,217	--	--	--
2000	1,992	841	18,686	5,948	1,971	108	58,589	85,302	0	--	--	--	10	64,311	--	--	--
2001	1,937	719	21,700	6,367	4,533	333	65,566	98,500	0	--	--	--	12	63,041	--	--	--
2002	1,973	785	14,644	9,188	4,821	194	65,196	94,043	0	--	--	--	14	48,448	--	--	--
2003	1,976	821	10,749	6,665	5,009	53	60,653	83,129	0	--	--	--	16	49,909	--	--	--
2004	1,914	876	14,218	4,799	5,720	14	60,641	85,393	0	--	--	--	20	48,812	--	--	--
2005	1,956	822	13,230	1,752	5,375	11	61,985	82,354	0	--	--	--	30	50,242	--	--	--
2006	1,870	792	13,861	3,000	5,503	102	61,277	83,743	0	--	--	--	54	50,991	--	--	--
2007	1,818	798	11,461	1,913	4,448	11	62,633	80,464	0	--	--	--	74	50,538	--	--	--
2008	1,688	788	12,718	4,048	3,930	396	53,724	74,816	0	--	--	--	119	51,031	--	--	--
2009	1,330	772	10,312	5,733	3,742	6	R 45,387	65,180	0	--	--	--	156	47,835	--	--	--
2010	1,419	771	12,203	5,771	5,773	10	R 44,405	R 68,161	0	--	--	--	220	49,301	--	--	--
2011	1,536	753	13,377	6,235	5,677	7	R 49,696	R 74,992	0	--	--	--	319	49,936	--	--	--
2012	1,323	789	12,976	5,956	6,020	5	R 46,112	R 71,070	0	--	--	--	522	46,952	--	--	--
2013	1,383	829	12,919	5,932	6,256	6	R 50,434	R 75,546	0	--	--	--	655	54,397	--	--	--
2014	1,399	834	13,895	6,277	4,539	5	R 48,278	R 72,995	0	--	--	--	841	52,898	--	--	--
2015	1,334	R 823	13,978	6,101	5,962	46	R 47,530	R 73,617	0	--	--	--	1,046	52,562	--	--	--
2016	1,389	816	13,140	5,926	5,952	57	49,800	74,876	0	--	--	--	1,388	50,979	--	--	--
Trillion Btu																	
1960	35.2	466.3	59.0	17.6	15.0	67.6	238.9	398.1	(s)	56.3	NA	NA	NA	68.9	1,024.8	170.4	1,195.2
1965	63.2	567.4	75.7	20.0	11.8	74.5	255.7	437.7	(s)	74.8	NA	NA	NA	98.6	1,241.7	235.4	1,477.2
1970	59.3	749.1	49.6	34.2	10.2	76.2	286.9	457.0	(s)	91.7	NA	NA	NA	143.9	1,501.1	348.1	1,849.1
1975	56.4	703.6	61.3	57.2	7.0	52.2	315.4	493.1	0.0	99.3	NA	NA	NA	157.1	1,509.5	376.9	1,886.5
1980	66.1	507.4	90.7	46.8	8.9	78.9	403.8	629.2	0.0	61.1	NA	NA	NA	177.0	1,440.8	425.3	1,866.1
1985	44.0	449.5	103.6	46.0	16.1	117.8	410.8	694.3	0.0	71.6	0.3	NA	NA	180.7	1,440.4	414.0	1,854.4
1990	64.7	606.7	99.5	43.9	16.6	11.6	410.2	581.7	0.0	65.3	0.2	0.6	(s)	190.7	1,510.1	418.6	1,928.8
1995	57.9	705.4	67.9	30.3	14.9	9.2	343.7	466.0	0.0	42.3	0.3	1.4	0.1	195.7	1,469.0	428.3	1,897.4
1996	56.2	726.4	69.1	20.0	14.3	1.9	380.6	485.9	0.0	35.6	0.1	1.4	0.1	196.8	1,502.4	435.7	1,938.1
1997	62.2	807.3	81.7	14.8	15.2	0.6	364.8	477.1	0.0	42.1	0.2	1.6	0.1	211.6	1,602.1	469.8	2,072.0
1998	43.3	864.8	74.8	11.0	17.0	0.2	357.4	460.4	0.0	34.7	0.3	1.6	0.1	210.3	1,615.4	476.1	2,091.5
1999	46.8	803.6	85.9	18.0	10.0	3.6	394.4	512.0	0.0	37.6	0.2	1.2	0.1	215.7	1,617.2	498.8	2,116.0
2000	47.4	803.8	108.7	21.1	10.3	0.7	364.7	505.4	0.0	41.1	0.3	1.3	0.1	219.4	1,618.9	483.5	2,102.4
2001	46.7	730.3	126.3	22.6	23.6	2.1	404.3	578.9	0.0	50.9	0.3	1.4	0.1	215.1	1,623.7	475.9	2,099.6
2002	47.1	800.0	85.2	32.6	25.1	1.2	401.3	545.5	0.0	34.9	0.4	1.4	0.1	165.3	1,594.7	368.7	1,963.5
2003	47.7	837.5	62.5	23.7	26.1	0.3	371.4	484.0	0.0	33.8	0.5	1.0	0.2	170.3	1,575.0	363.5	1,938.5
2004	46.2	893.4	82.7	17.1	29.8	0.1	374.8	504.4	0.0	34.0	0.5	1.1	0.2	166.5	1,646.3	360.3	2,006.6
2005	46.3	841.1	77.0	6.2	27.9	0.1	382.0	493.2	0.0	37.0	0.9	1.3	0.3	171.4	1,591.5	349.2	1,940.8
2006	45.1	809.8	80.4	10.6	28.6	0.6	377.2	497.5	0.0	30.6	2.3	1.3	0.5	174.0	1,561.0	356.1	1,917.1
2007	43.1	821.4	66.3	6.7	22.9	0.1	387.2	483.2	0.0	31.5	5.0	1.4	0.7	172.4	1,558.8	336.2	1,895.1
2008	39.4	809.4	73.5	14.2	20.1	2.5	332.2	442.6	0.0	28.3	5.3	1.4	1.2	174.1	1,501.7	345.4	1,847.1
2009	31.3	792.7	59.6	19.9	19.1	(s)	279.8	378.4	0.0	26.7	2.7	1.2	1.5	163.2	1,397.8	316.4	R 1,714.2
2010	33.2	787.4	70.5	22.1	29.3	0.1	R 271.6	R 393.6	0.0	R 29.9	3.9	1.2	R 2.1	168.2	R 1,419.6	321.4	R 1,741.0
2011	35.6	767.4	77.2	23.9	28.8	(s)	R 306.2	R 436.1	0.0	R 32.6	9.8	1.2	3.1	170.4	R 1,456.3	329.2	R 1,785.6
2012	30.7	805.5	74.9	22.8	30.5	(s)	R 284.3	R 412.6	0.0	R 31.7	9.5	1.2	5.0	160.2	R 1,456.3	292.0	R 1,748.3
2013	31.9	850.3	74.5	22.7	31.7	(s)	R 310.3	R 439.2	0.0	R 31.6	8.9	1.2	6.3	185.6	R 1,555.1	328.7	R 1,883.8
2014	32.6	R 857.8	80.1	24.1	23.0	(s)	R 297.3	R 424.6	0.0	R 28.5	9.8	1.2	8.0	180.5	R 1,543.0	318.1	R 1,861.1
2015	31.0	R 853.1	80.6	23.4	30.2	0.3	R 292.7	R 427.1	0.0	R 27.0	10.8	1.2	9.7	179.3	R 1,539.3	312.9	R 1,852.2
2016	32.1	844.5	75.8	22.7	30.1	0.4	306.4	435.4	0.0	28.8	11.6	1.2	12.8	173.9	R 1,540.4	312.7	R 1,853.1

^a Natural gas as it is consumed; includes supplemental gaseous fuels that are commingled with natural gas.^b Hydrocarbon gas liquids, include natural gas liquids and refinery olefins.^c Beginning in 1993, includes fuel ethanol blended into motor gasoline. There is a discontinuity in this time series between 2014 and 2015 because of coverage. See Technical Notes, Section 4.^d Includes asphalt and road oil, aviation gasoline, kerosene, lubricants, petroleum coke, and the "other petroleum products" category. See Technical Notes, Section 4.^e Conventional hydroelectric power. For 1960 through 1989, includes pumped-storage hydroelectricity, which cannot be separately identified.^f There is a discontinuity in this time series between 1988 and 1989 due to the expanded coverage of renewable energy sources beginning in 1989.^g Wood, wood-derived fuels, and biomass waste. Prior to 2001, includes non-biomass waste.^h Losses and co-products from the production of fuel ethanol.ⁱ Solar thermal and photovoltaic energy. Excludes a small amount of solar thermal energy consumed as heat that is included in the residential sector.^j For 1981 through 1992, includes fuel ethanol blended into motor gasoline that is not included in the motor gasoline

column. Beginning in 2009, includes a small amount of wind energy consumed by industrial utility-scale facilities. Beginning in 1980, adjusted for